Sanford R. Wilbur, March 15, 2004, Phone Interview by Mark Madison

Started with the Service as trainee program went to work for refuges. Wilderness Act passed in 1964 moved to Portland Regional office on Wilderness studies for several years. In the 1960s there were only 3 "birders" Gene Kridler, Dave Marshall and Wilbur. Most of other FWS were wildlife management types, hunters, anglers. 1966 red book being put together by John Aldrich et al. Initially Red Book was mostly birds. Everyone was scratching heads and saying "do you know anything that ought to be on the list." In 1967 Patuxent had sent first 2 endangered species biologists in Hawaii. Wilbur was out there with them for a while.

Fred Sibley left condor program in 1969 and Wilbur took over that same year 1969. Wilbur had grown up in bay area and lived in CA and Condor had always been a love of his life. Two things led to him getting job: 1) he knew Dave Marshall and Ray Erickson (wrote original FWS report on Condor). 2) Ray had been convinced for some time the condor was not going to be saved by conventional methods the program had been going on for so long. Ray was ready to make a contingency plan. Ray had been working with Andean condors at Patuxent to work on contingencies. Ray wanted someone who could also do Public Relations to not only do research but could talk about program. Wilbur had written articles and even done some acting, had spoken publicly about Wilderness Act. Erickson felt they would have to "sell" the captive breeding program.

The public involvement was not really there into the 1960s. Erickson and Marshall wrote a report on proposed dam on Sespe water project and one result of the report was to get Fred Sibley assigned as first FWS biologist for condors. Fred's main job was to study effects of disturbance on CA condor and see what effects are. Sibley did a lot of field work and library work and did a lot of historical research. His main publication was in house survey on effects of Sespe water project on Condors. He noted you should not have big projects within a mile of condor nests. Sibley's report killed the water dam project. Sibley left FWS after Santa Barbara oil spill felt FWS was too silent on bird damage of oil spill.

Wilbur came in afterward. Wilbur was to study general location and productivity of condors, effect of food supplies, pesticides, animal control programs, and a means to census the birds. Between 1969-81 those were Wilbur's tasks—main theme was: condor mortality (past and present) and food supply.

To study mortality found out where condor skins and eggs were in collections. Many condor eggs were taken by oologists as part of egg-collecting fad. Scientific and hobby collection may led to initial decimation up to 1920. Malicious shooting was hard to document since there was not a good records of this. Using the paltry existing records tried to develop some estimate of malicious shooting and found this may have been the biggest thing still affecting mortality in the 1970s. Also poisoning for predator and ground squirrel control was an issue. Ground squirrels were very actively poisoned by strychnine and Compound 1080. Squirrels were blamed for bubonic plague, but reality was they dug too many holes and ate too much grain on farmers and ranchers lands. In

late 1800s grizzly and wolves were poisoned into extirpation but the evidence for killing condors was not clear. Problem in the 1970s was to determine if compound 1080 (used for squirrels) was killing condors. Wilbur concluded there was no evidence that 1080 killed condors, Strychnine did probably kill a few. Concluded this was a bird species that has no real enemies so any mortality is critical especially when it exceeds productivity. Developed a technical committee with NAS, CFG, BLM, FS, FWS. Eventually developed what became a recovery plan. One of the results was there was not much left to do in the wild. The FS was totally into habitat, Sespe was one of the most inviolate sanctuaries of the time, even the few researchers had to have permits. Shooting was bad but extremely difficult to control. Recovery plan did recommend buying some inholdings with condor nests. Felt all these habitat recommendations were good none of this would be enough what was needed was a contingency plan to captively breed.

Captive breeding was very controversial in CA. In the 1950s when a San Diego Zoo tried to start a captive breeding program (had learned double clutching with Andean condors at zoo, getting more than one egg a year normal). At same time Koford's study hit streets in the 1950s and said condors were in bad shape and you should not do anything to them at all, Koford enlisted Ike and Ed Macmillan and they got a state law passed in the 1950s that condors could not be taken for any purposes. Law prevented any taking of condors. Law precluded radio transmitters any captive breeding, any banding for scientific studies. So Sibley's hands were tied to get scientific evidence. The Technical Committee was not willing to take the flak in this era to go against the statute passed in the 1950s. CA law was very rigid. ESA was too new for this type of political fight. Wilbur felt needed to get NAS, CFG behind the captive breeding to change law. So they went on for a number of years hoping that normal recovery would do the job. But every time they did a census the numbers were clearly declining. Finally, in desperation Wilbur wrote a long-letter explaining what he thought was happening with the population. Came to conclusion either condors were suffering a lag effect from say DDT (condors suffered egg shell thinning) and everything would improve or else, more likely we would sit on the side lines and watch them age and go extinct. Finally technical committee decided to tackle this. Initially involved just getting some markers on the birds to track them. Then situation became so dire that these markers were abandoned to full ahead with captive breeding.

Captive breeding was supported by most of the biologists and public in the know---those who understood this was last chance. Time and money costs were an issue. Philosophically some felt a condor in the cage was not really a condor. FWS was still hesitant because they thought it would be a hot potato. Eventually got NAS, FS and CFG on board for captive breeding program. Everything seemed lined up with partners but plan sat for years in D.C. It finally took setting up a blue-ribbon committee through AOU to break through road block. AOU Report confirmed recovery plan findings said situation was even more dire. So D.C. moved ahead but at this time Public Relations broke down.

Endangered Species are different than other species FWS worked with in the past. A lot of mistakes were made, Wilbur lost his job in this era in 1981. Noel Snyder took

Wilbur's job and NAS brought on John Ogden. Snyder and Ogden were great scientist but bad PR people. Wilbur was blamed for slowing down captive breeding program. Wilbur went to work for Area Office as "undercover coordinator". Some bad PR happened a chick was killed while handling. A fire was set while practicing using a cannon net for capturing condors. They were shut down for a couple of years following these disasters. When they finally decided all the birds had to be captured then Audubon pulled out of program around 1985.

NAS and University of CA were first groups interested. They got Koford funded, got FS to set up sanctuaries. They got first CA state laws and worked with CFG. FWS in early years was on negative side—they had predator and rodent control function. It was not till 1966 that federal control over condor occurred, but in effect NAS and CFG were still deeply involved. It was all cooperative, FWS could not tell FS what to do . NAS was in public sides, condor naturalist of NAS, John Borneman, helped a lot. Good partnership but nobody really had authority at the time. NAS became a partner later without authority.

Condors have died of lead poisoning but real threat is hard to discern. NAS wanted FWS to buy Bitter Creek (Hudson Ranch) at time of taking all birds out of wild and this was a political issue (circa 1984-1985). Wilbur did not support taking all the birds in. Felt the whole condor program had such a small gene pool for so long. Some geneticists Wilbur talked to felt this was not an issue for such a long-lived bird species. Wilbur felt you should keep some in the wild because very few people were interested in zoo condors. Also Wilbur felt having condors in habitat for FS and other agencies was critical to keep down development. Felt there was so much pressure on habitat that if you did not keep up interest in birds in habitat when you put them back in 10-20 years there might not be any habitat left to release them to. Birds were still producing in the wild, there weren't very many and they weren't enough but to take them all in meant we had given up on the wild population.

World divided into 3.

- 1. Those who didn't know condors or care.
- 2. Those who thought should be saved at all costs.
- 3. Those who considered it a "relict of Pleistocene" and doomed to extinction. [Last one was used 2 ways. Used to justify drilling or any development. Others who loved condors and felt sad about its demise.]

Wilbur had to support #2 because for recovery team "it was our job." Countered #3 by saying yes it was shrinking range and diminishing of food source certainly down from Pleistocene. Yet everything bad that happened to condor since 1600 was people driven.

Even in Wilbur's career once saw 18 in one flock and then they declined precipitously.

Later Andean condor was listed which added complexity. Andean very similar to CA condor. Andean was a great surrogate to get ideas of CA condor for to get ideas such as double-clutching (found first in San Diego Zoo). Some of the things the Andean condor

was used for not so good. Andeans were released into CA habitat and then later all taken into habitat. Was supposed to tell about habitat or hold habitat for CA condors. "Talk about a public relations nightmare, there are still people who feel condors carry off cows and such, Andean condors has been known to kill small mammals." Stan Temple and Mike Wallace showed you can get a lot more condors produced in captivity than in the wild. You knew you could produce more in captivity, question was would they form a self-sustaining independent unit again in the wild. In wild condors lay only one egg in each clutch. Takes so long for young to hatch and get independent you can only nest every 2nd year. When mortality grows you can quickly start declining. Double and triple clutching you can take egg away and get them to raise more eggs. First year in the 1950s in San Diego zoo got 6 eggs and young in one year's time. In 1981 25 birds left in population now approx. 250 birds.

Wilbur initially opposed "egg-napping" the poor PR term for taking eggs from wild to raise in captivity. But it turned out to work well.

In 1970s and 1980s most of critical habitat was in the National Forest and they were mostly concerned about inholdings in Los Padres. They had a list of 9 inholdings they wanted to protect from oil drilling etc. Recovery plan recommended buying Hopper Ranch. Big one they proposed buying Tejon Ranch felt condor survival depended on buying this. Tejon Ranch is combination of 3 Spanish land grants take in all of Tehachapi Mountains over 200,000 acres of land. They do a lot of farming on San Joaquin on floor. Hillsides were used for cattle ranching and completely locked up. Would have been ideal condor sanctuary could see it from Hopper ridge. Cattle was fine for condors, but later as development threatened then condors have troubles. Attempted to create some easement but it fell apart. Felt one of failures of program was not getting habitat or looking far enough ahead to acquire habitat.

As regards human take with power lines etc. "Southern California is a hell of a place to make a last stand for an endangered species." When they started releasing the zoo birds they had tried to feed them with puppets but they were still a lot tamer than birds should be. Releasing birds in small flocks they became gangs, they started doing things they don't normally do like perch on a power line and invade people's homes and tear up furniture. The more they release birds the more they are becoming adaptable to wild. Question about what type of cohorts to release them with should they all be the same age or different ages.

Confusions cost support but success is even better than expected.